

AMENDMENTS TO THE SPECIFICATION:

Please amend the third paragraph on page 12 as follows:

Then, as shown in the cross-sectional view of FIG. 5C, a second insulating layer 505 followed by a third ~~second~~ metal (e.g., aluminum) layer 506 is formed. There are now three metallic layers including a first metal (e.g., gold) layer 502, a second metal (e.g., aluminum) layer 504 and a third ~~second~~ metal (e.g., aluminum) layer 506 separated by insulating layers 503 and 505. The third ~~second~~ metal layer 506 is at least formed on lines L3 and L5 as shown in FIG. 5D.

Please amend the first paragraph on page 13 as follows:

For the connections C1, the first metal (e.g., gold) layer 502 in line L2 ~~L2~~ is connected to the first metal (e.g., gold) layer 502 in line L4 and the metal (e.g., gold) layer in line L6 is connected to the second metal layer 504 by applying a field(s) (e.g., an AC electric field) between the two appropriate lines in the presence of metal (e.g., gold) nanoparticles. The precise field type used is determined by the spacing between the lines. The spacing, in turn, may be determined by the desired device dimension.

Please amend the second paragraph on page 13 as follows:

In crossover C2, the first metal (e.g., gold) layer 502 in line L1 is connected to the third ~~second~~ metal (e.g., aluminum) layer 506 and then to the first metal (e.g., gold) layer 502 in line L3, thus providing a crossover of line L2.

Please amend the third paragraph on page 13 as follows:

In crossover C3, second metal (e.g., aluminum) layer 504 in line L2 is connected to the third ~~second~~ metal (e.g., aluminum) layer 506 in line L3, which in turn is connected to line L4. In crossover C4, third ~~second~~ metal (e.g., aluminum) layer 506 from line L3 is connected to third ~~second~~ metal (e.g., aluminum) layer 506 of line L5 via third ~~second~~ metal (e.g., aluminum) layer 506 of line L4. The last crossover C5, connects third ~~second~~ metal (e.g., aluminum) layer 506 of line L5 to second metal (e.g., aluminum) layer 504 of line L6 via third ~~second~~ metal (e.g., aluminum) layer 506 of line L5.